

AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions and listings of claims in the application.

1. (previously presented) A method for providing content, comprising the steps of:
receiving a request from a user device for particular content, said request is received at a server;

accessing a mark-up language description of said particular content, said mark-up language description includes one or more source files which describe a behavior of said particular content on a user interface of said user device based on user interactions with the particular content via the user interface, said particular content includes data for rendering on said user interface, said one or more source files define a connection to an external data source for said data, said external data source is external to said server;

accessing said data at said external data source based on said one or more source files which define said connection to said external data source, said server performs said accessing;

compiling said mark-up language description of said particular content, including said data, to create executable code for said user device, said step of compiling is performed at said server in response to said request; and

transmitting said executable code from said server to said user device for execution by said user device to provide said particular content via said user interface according to said one or more source files, and according to said behavior and said user interactions.

2. (cancelled)

3. (cancelled)

4. (previously presented) A method according to claim 1, wherein:
said user device includes a rendering entity and a browser, said rendering entity is a plug-in to said browser, said plug-in is embedded in said browser before said request, and said rendering entity executes said executable code.

5. (previously presented) A method according to claim 1, wherein:
after said data is accessed from said external data source, said data is provided in a markup language document, said step of compiling includes converting said data in said markup language document to ActionScript and compiling said ActionScript into ActionScript byte code.

6. (original) A method according to claim 1, wherein:
said step of transmitting includes using HTTP to transmit said executable code via a network.

7. (previously presented) A method according to claim 1, wherein:
said request for particular content is received from a browser in which a rendering entity is present as a plug-in to said browser, said browser is at said user device, and said rendering entity executes said executable code.

8. (previously presented) A method according to claim 1, further comprising the steps of:
accessing media content comprising at least one of audio, video and a movie, said particular content includes said media content;
providing a reference in said mark-up language description to a media file which contains said media content, said media file is external to said mark-up language description; and
transmitting said media file with said executable code from said server to said user device for use by a rendering entity at said user device in rendering said media content on said user interface when said media file is referenced when said executable code is executed.

9. (previously presented) A method according to claim 1, wherein said step of compiling comprises the steps of:
converting said mark-up language description to ActionScript; and
compiling said ActionScript into ActionScript byte code.

10. (previously presented) A method according to claim 8, further comprising:

transcoding said media file to an accepted format before said transmitting of said media file, said transcoding is separate from said compiling.

11. (previously presented) A method according to claim 1, further comprising the step of:

authenticating said request, said steps of compiling and transmitting are only performed if said step of authenticating is successful, different types of authenticating are provided for at least one of: a) different types of content and b) each item of content.

12. (cancelled)

13. (previously presented) A method according to claim 1, wherein said particular content includes a first application which runs on said user device after said executable code is transmitted from said server to said user device, the method further comprising the steps of:

receiving a request at said server from said user device for second content when said first application which runs on said user device calls said second application;

accessing a mark-up language description of said second content;

compiling said mark-up language description of said second content; and

transmitting said compiled mark-up language description of said second content from said server to said user device.

14. (previously presented) A method for providing content, comprising the steps of:

receiving a request for particular content, said request is received at a server;

in response to said request, accessing first code associated with said particular content, said first code includes a mark-up language description and a scripting language description;

compiling said mark-up language description and said scripting language description to create combined executable code from both said mark-up language description and said scripting language description that implements a user interface that provides access to said particular content, said step of compiling is performed at said server in response to said request; and

transmitting said executable code from said server to a client.

15. (original) A method according to claim 14, wherein:
said request is from said client.
16. (original) A method according to claim 14, wherein:
said particular content includes data; and
said data is compiled to executable code during said step of compiling.
17. (previously presented) A method according to claim 16, wherein:
said step of compiling includes converting said data to ActionScript and compiling said
ActionScript into ActionScript byte code.
18. (cancelled)
19. (previously presented) A method according to claim 14, wherein:
said markup language description includes elements which are identified by markup
language tags, at least one of said elements provides a script source of said scripting language
description.
20. (currently amended) A method according to claim 14, further comprising the steps
of:
accessing media content, said particular content includes said media content;
transcoding said media content to an accepted format, said transcoding is separate from said
compiling;
providing a reference to said ~~transformed~~transcoded media content in said executable code;
and
transmitting said ~~transformed~~transcoded media content with said executable code from said
server to said client for execution by said client, where, during the execution at said client, when said
reference is reached, said client renders said ~~transformed~~transcoded media content.

21. (previously presented) A method for providing content, comprising the steps of:
receiving a request for content that includes data other than code, said data is for rendering on a user interface at a client, and said request is received at a server;
accessing a mark-up language description associated with said content at said server, said mark-up language description defines a connection to an external data source for said data, said external data source is external to said server;
acquiring said data from said external data source in response to said mark-up language description, said data is acquired by said server;
compiling said content at said server to create executable code, said content is based on said mark-up language description and said data, said executable code includes a representation of said data, said step of compiling is performed in response to said request; and
transmitting said executable code from said server to said client.

22. (original) A method according to claim 21, wherein:
said request is from said client.

23. (previously presented) A method according to claim 21, wherein:
said executable code implements said user interface, said user interface provides access to said data.

24. (previously presented) A method according to claim 21, wherein:
said step of compiling includes converting said data to ActionScript and compiling said ActionScript into ActionScript byte code.

25. (cancelled)

26. (cancelled)

27. (currently amended) A method according to claim 21, further comprising the steps of:

accessing media content;
transcoding said media content to an accepted format, said transcoding is separate from said compiling; and
transmitting said ~~transformed~~ transcoded media content with said executable code from said server to said client.

28. (previously presented) One or more processor readable storage devices having processor readable code embodied on said processor readable storage devices, said processor readable code for programming one or more processors to perform a method comprising the steps of:
receiving a request for particular content from a browser, said browser having a plug-in embedded therein, said request is received at a server;
accessing a mark-up language description of said particular content, said mark-up language description references a media file comprising at least one of audio, video and a movie;
compiling said mark-up language description of said particular content to create executable code for said plug-in to said browser, said executable code provides said particular content, said step of compiling is performed at said server in response to said request; and
transmitting said executable code and said media file from said server to said plug-in, said plug-in renders said particular content based on said executable code and said media file.

29. (cancelled)

30. (original) One or more processor readable storage devices according to claim 28, wherein:
said executable code implements a user interface that provides access to said particular content.

31. (original) One or more processor readable storage devices according to claim 28, wherein:
said particular content includes data; and
said data is compiled to executable code during said step of compiling.

32. (previously presented) One or more processor readable storage devices according to claim 28, wherein said method further comprises the steps of:

transcoding said media file to an accepted format before transmitting said media file, said transcoding is separate from said compiling.

33. (previously presented) One or more processor readable storage devices having processor readable code embodied on said processor readable storage devices, said processor readable code for programming one or more processors to perform a method comprising the steps of:

receiving a request for particular content, said request is received at a server from a web client in which a plug-in is embedded;

accessing first code associated with said particular content;

in response to said request, compiling said first code to create executable code for said plug-in to said web client, said executable code implements a user interface that provides access to said particular content, said step of compiling is performed at said server in response to said request; and

transmitting said executable code from said server to said plug-in for execution by said plug-in.

34. (cancelled)

35. (cancelled)

36. (currently amended) One or more processor readable storage devices according to claim 33, wherein said method further comprises the steps of:

accessing media content, said particular content includes said media content;

transcoding said media content to an accepted format, said transcoding is separate from said compiling; and

adding said ~~transformed~~transcoded media content to said executable code.

37. (previously presented) One or more processor readable storage devices having processor readable code embodied on said processor readable storage devices, said processor readable code for programming one or more processors to perform a method comprising:

receiving a request for content that includes data other than code, said data is for rendering on a user interface by a rendering entity which is present at a client, said rendering entity is separate from a browser but operates within said browser, and said request is received at a server;

acquiring said data from a data source external to said server, said acquiring is performed by said server;

compiling said data at said server to create executable code for said rendering entity, said executable code includes a representation of said data, said step of compiling is performed in response to said request; and

transmitting said executable code from said server to said rendering entity.

38. (original) One or more processor readable storage devices according to claim 37, wherein:

said request is from said client.

39. (previously presented) One or more processor readable storage devices according to claim 37, wherein:

said executable code implements said user interface, said user interface provides access to said data.

40. (previously presented) One or more processor readable storage devices according to claim 37, wherein said method further comprises the steps of:

accessing media content;

providing a reference to said media content in said executable code; and

transmitting said media content with said executable code from said server to said rendering entity.

41. (previously presented) An apparatus, comprising:

one or more storage devices; and

one or more processors in communication with said one or more storage devices, said one or more processors: (a) receive a request for particular content from an HTTP client having a plug-in embedded therein, said request is received at a server, (b) access a mark-up language description of said particular content, said mark-up language description describes a behavior of said particular content on a user interface of said HTTP client based on user interactions with the particular content via the user interface, and (c) compile said mark-up language description of said particular content to create executable code for said plug-in to said HTTP client, said executable code provides said particular content, said compiling is performed at said server in response to said request, and said executable code is transmitted from said server to said plug-in for execution by said plug-in to provide said particular content via said user interface according to said behavior and said user interactions.

42. (original) An apparatus according to claim 41, wherein:
said executable code implements a user interface that provides access to said particular content.

43. (original) An apparatus according to claim 41, wherein:
said particular content includes data; and
said data is compiled to executable code during said step of compiling.

44. (previously presented) An apparatus according to claim 41, wherein:
said particular content includes at least one of audio, video and a movie.

45. (previously presented) An apparatus, comprising:
one or more storage devices; and
one or more processors in communication with said one or more storage devices, said one or more processors perform a method comprising the steps of:

receiving a request for particular content, said request is received at a server, said request is from a client which includes a browser and a rendering engine that is different than said browser but operates in connection with said browser;

accessing first code associated with said particular content at said server, said first code comprises elements that are identified by markup language tags, at least one of said elements references a source external to said server;

compiling said first code to create executable code for said rendering engine, said step of compiling is performed at said server in response to said request, and

transmitting said executable code from said server to said client for rendering of said particular content by said rendering engine, said executable code implements a user interface at said client that provides access to said particular content.

46. (previously presented) An apparatus according to claim 45, wherein:
said particular content includes data stored at said source, said accessing first code includes accessing said data at said source; and
said data is compiled to executable code during said step of compiling.

47. (currently amended) An apparatus according to claim 45, wherein said method further comprises the steps of:

accessing media content, said particular content includes said media content, at least one of said elements identifies said media content;

transcoding said media content to an accepted format, said transcoding is separate from said compiling; and

transmitting said ~~transformed~~ transcoded media content with said executable code to said client for rendering of said transcoded ~~transformed~~ media content by said rendering engine.

48. (previously presented) An apparatus, comprising:
one or more storage devices; and
one or more processors in communication with said one or more storage devices, said one or more processors: a) receive a request for content that includes data other than code, said request is

received at a server, said request is from a client, b) access a mark-up language description and a scripting language description associated with said content at said server and acquire said data from a source external to said server, said data is acquired by said server, script code of said scripting language description is contained within script tags of said markup language description c) compile said mark-up language description and said scripting language description at said server to create executable code, said executable code includes a representation of said data, said compiling is performed in response to said request, and d) transmit said executable code from said server to said client.

49. (original) An apparatus according to claim 48, wherein:
said executable code implements a user interface that provides access to said data.

50. (previously presented) An apparatus according to claim 48, wherein:
said data includes media content.

51. (previously presented) A method according to claim 21, wherein:
said data is media data comprising at least one of audio, video and a movie.

52. (previously presented) A method according to claim 4, wherein:
said request is received at said server from said user device and includes an indication that identifies a type of said rendering entity from a group of rendering entities; and
said compiling includes creating said executable code specific for said type of rendering entity in response to said indication.

53. (previously presented) A method according to claim 1, wherein:
said executable code comprises one or more binary files.

54. (previously presented) A method according to claim 1, wherein:
said executable code comprises at least one of object code and byte code.

55. (previously presented) One or more processor readable storage devices according to claim 33, wherein:

said first code comprises elements which are identified by markup language tags.

56. (previously presented) One or more processor readable storage devices according to claim 55, wherein:

at least one of said elements defines a view template of a user interface element, said view template is instantiated when said executable code is executed by said rendering entity.

57. (previously presented) One or more processor readable storage devices according to claim 56, wherein:

said elements comprise at least one element which defines a view class which supplies default properties, behavior, and child views which the view template instantiates, the child views are associated with a parent view.

58. (previously presented) One or more processor readable storage devices according to claim 55, wherein:

at least one of said elements references a media file comprising at least one of audio, video and a movie.

59. (cancelled)

60. (previously presented) One or more processor readable storage devices according to claim 55, wherein:

at least one of said elements references a media file that contains an animation.

61. (previously presented) One or more processor readable storage devices according to claim 55, wherein:

at least one of said elements references a media file that contains a movie.

62. (previously presented) One or more processor readable storage devices according to claim 28, wherein:

said media file comprises a .SWF file, said markup language description references said .SWF file.

63. (cancelled)

64. (previously presented) One or more processor readable storage devices according to claim 55, wherein:

at least one of said elements provides an inline definition of formatted text.

65. (previously presented) One or more processor readable storage devices according to claim 55, wherein:

at least one of said elements provides an inline definition of vector graphics.

66. (cancelled)

67. (previously presented) A method according to claim 1, wherein:
said markup language description comprises elements which are identified by markup language tags; and

said elements comprise at least one element which references said connection to said external data source.

68. (previously presented) One or more processor readable storage devices according to claim 55, wherein:

at least one of said elements defines a connection to a web service which is external to said server.

69. (previously presented) A method according to claim 1, wherein:

said compiling comprises parsing said markup language description to identify first and second types of elements in the markup language description, providing said first type of element to a first compiling module which is appropriate for said first type of element to obtain first object code, providing said second type of element to a second compiling module which is appropriate for said second type of element to obtain second object code, and assembling said first and second object code into a single executable; and

said transmitting said executable code comprises transmitting said single executable to said user device.

70. (previously presented) A method according to claim 69, wherein:
said first type of element provides a script which defines said behavior of said particular content, and said second type of element defines said connection to said external data source.

71. (cancelled)

72. (cancelled)

73. (previously presented) A method according to claim 4, wherein:
said rendering entity is a Flash player.

74. (previously presented) A method according to claim 14, wherein:
at least one of said elements of said markup language description instantiates a class defined in the scripting language description.

75. (previously presented) A method according to claim 14, wherein:
said scripting language description extends a class defined in said markup language description.

76. (previously presented) A method according to claim 27, wherein:

said transcoding comprises at least one of: (a) transcoding one audio format to another audio format, and (b) transcoding one video format to another video format.

77. (previously presented) One or more processor readable storage devices according to claim 55, wherein:

said elements comprises elements which define script code, said script code specifies a visual appearance of said user interface.

78. (previously presented) One or more processor readable storage devices according to claim 55, wherein:

said elements comprises elements which define script code, said script code specifies an application logic of said mark-up language description.

79. (previously presented) One or more processor readable storage devices according to claim 55, wherein:

said elements comprises elements which define script code, said script code specifies a connection to an external data source, said external data source includes data for rendering on said user interface by said plug-in.

80. (previously presented) A method according to claim 28, wherein:
said plug-in is a Flash player.

81. (previously presented) A method according to claim 8, further comprising:
providing an object in the executable code which identifies at least one of a name and a format of the media content, the at least one of name and a format is provided via the user interface when said media content is rendered.

82. (previously presented) A method according to claim 8, wherein:
said request for particular content is received from a browser in which a plug-in to said browser is present, said browser is at said user device, and said plug-in renders said media content.

83. (previously presented) A method according to claim 1, wherein:

said executable code provides a script which is executed when a specified event occurs when a user interacts with the particular content via the user interface, the specified event is based on user control of a pointing device or a key press.